

### **DETAILED ACTION**

1. This communication is responsive to the amendment filed 05/13/2008 and the telephonic interview on 09/11/2008.

Claims 4-8, 14-18, 23-25, and 27-30 have been examined and allowed.

2. **EXAMINER'S AMENDMENT:**

An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it **MUST** be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Ms. Amita Pugalia (Registration No. 57, 367) on 09/11/2008.

**The application has been amended as follows:**  
**In the Claims:**

**This listing of claims will replace all prior versions, and listings, of claims in the application:**

1.-3. (Canceled)

4. (Previously Presented) A method of dynamically communicating an object message between a client and server of separate object models comprising the steps of:

dynamically creating a mapping of said client to said server at run time in

response to a request from said client for a connection to said server;

intercepting a message generated by said client in a first object model;

examining a second object model for interface information for said server;

generating a translated message for said server; and

forwarding said translated message to said server;

wherein dynamically creating the mapping includes determining interface requirements at run time without requiring creation prior to run time of a static interface that defines communication between said client and said server and wherein said step of dynamically creating a mapping further comprises the steps of:

creating a proxy object;

creating a stub object; and

creating an association between said proxy object and said stub object.

5. (Original) The method of claim 4 further comprising the step of creating an association between said client and said proxy object.

6. (Original) The method of claim 4 further comprising the step of creating an association between said server and said stub object.

7. (Original) The method of claim 4 further comprising the step of creating an association between said server and said proxy object.

8. (Original) The method of claim 4 further comprising the step of creating an association between said client and said stub object.

9.-13. (Canceled)

14. (Currently Amended) An article of manufacture comprising:

a computer usable medium having computer readable program code embodied therein for dynamically handling an object message between a client and server in separate object models, the computer readable program code in said article of manufacture comprising:

computer readable program code configured to cause a computer to dynamically create a mapping of said client to said server at run time in response to a request from said client for a connection to said server;

computer readable program code configured to cause [[a]] said computer to intercept a message generated by said client in a first object model;

computer readable program code configured to cause [[a]] said computer to examine a second object model for interface information for said server;

computer readable program code configured to cause [[a]] said computer to generate a translated message for said server;

computer readable program code configured to cause [[a]] said computer to forward said translated message to said server; and

computer readable program code configured to cause [[a]] said computer to transmit a response from said server to said client;

wherein to dynamically create the mapping includes to determine interface requirements at run time without requiring creation prior to run time of a static interface that defines communication between said client and said server and wherein said program code configured to cause [[a]] said computer to dynamically create a mapping of said client to said server further comprises:

computer readable program code configured to cause [[a]] said computer to create a proxy object;

computer readable program code configured to cause [[a]] said computer to create a stub object; and

computer readable program code configured to cause [[a]] said computer to create an association between said proxy object and said stub object.

15. (Currently Amended) The article of manufacture of claim 14 further comprising

computer readable program code configured to cause [[a]] said a computer to create an association between said client and said proxy object.

16. (Currently Amended) The article of manufacture of claim 14 further comprising computer readable program code configured to cause [[a]] said computer to create an association between said server and said stub object.

17. (Currently Amended) The article of manufacture of claim 14 further comprising computer readable program code configured to cause [[a]] said computer to create an association between said server and said proxy object.

18. (Currently Amended) The article of manufacture of claim 14 further comprising computer readable program code configured to cause [[a]] said computer to create an association between said client and said stub object.

19.-22. (Canceled)

23. (Currently Amended) A dynamic object message broker comprising An apparatus for dynamically brokering object messages among object models, the apparatus comprising:

a first computer system having a processor configured to run a first object model and a first object running in said first object model;

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a mediating component coupled to said first computer system, said mediating component capable of creating a dynamic messaging interface; and

a second computer system coupled to said mediating component, said second computer system having a processor configured to run a second object model and a second object running in said second object model;

wherein said mediating component is configured to dynamically create a mapping between said first object and said second object at run time in response to a request from said first object for a connection to said second object, wherein to dynamically create the mapping includes to determine interface requirements at run time without requiring creation prior to run time of a static interface that defines communication between said first object and said second object, and wherein said mediating component comprises:

a control module, said control module capable of creating said mapping between said first object and said second object;

a proxy object coupled to said control module; and

a stub object coupled to said proxy object.

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24. (Currently Amended) The ~~message broker~~ apparatus of claim 23 wherein said first object is a client object, and said proxy object is coupled to said client object.

25. (Currently Amended) The ~~message broker~~ apparatus of claim 24 wherein said second object is a server object, and said stub object is coupled to said server object.

26. (Canceled)

27. (Previously Presented) A method of dynamically communicating an object message between a client and server in separate object models comprising the steps of:

dynamically creating a proxy object and a stub object at run time in response to a request from said client for a connection to said server;

intercepting a message generated by said client in a first object model; examining a second object model for interface information for said server;

determining a message protocol for said server; generating a translated message from said message using said message protocol; and

forwarding said translated message to said server;

wherein dynamically creating said proxy object and said stub object comprises determining interface requirements at run time without requiring creation prior to run time of a static interface that defines communication between said client and said server.

28. (Original) The method of claim 27 further comprising the step of creating an association between said proxy object and said stub object.

29. (Original) The method of claim 27 wherein said message includes an operation and a plurality of arguments, said method further comprising the steps of: translating said operation for said server; and translating said plurality of arguments for said server.

30. (Previously Presented) The method of claim 29 wherein said step of translating said arguments further comprises the steps of:

determining the expected number and type of arguments of said server;

determining whether an expected argument type is different than an argument type; and

translating one of said plurality of arguments to an expected argument type when its type is different than said expected argument type.

31. (Canceled)

#### **CONTACT INFORMATION**

Any inquiry concerning this communication or earlier communications from the examiner should be directed to VAN H. NGUYEN whose telephone number is (571) 272-3765. The examiner can normally be reached on Monday-Thursday from 8:30AM - 6:00PM. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, MENG-AI AN can be reached at (571) 272-3756.

The fax phone number for the organization where this application or proceeding is assigned is **571-273-8300**.



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/VAN H NGUYEN/

**Primary Examiner, Art Unit 2194**